

REMARKS

Claims 1-73, 75-95 and 101-108 are pending in the application.

Each of the independent claims has been amended to require the liquid-swellaable material (e.g., the intermediate layer) "prior to exposure to liquid having a basis weight no greater than 10% of the basis weight of said sheet prior to exposure to liquid." Thus, regardless of the absolute basis weight of the liquid-swellaable material, the barrier sheet meets the claim requirement only if the basis weight of the liquid-swellaable material is less than 10% of the basis weight of the barrier sheet prior to exposure to liquid.

All claims stand rejected as anticipated by or, in the alternative, obvious over Ciammaichella, et al., U.S. 6,436,508.

As has already been noted for the benefit of the Examiner, while the present invention will find utility as a barrier sheet in absorbent articles such as diapers, it is intended that they also find utility in barrier garments such as surgical gowns, cleaning room garments, protective clothing and the like where the flexibility of the garment and its ability to drape or conform to the contour of the wearer's body is of critical importance. As set forth in the specification (as page 11, lines 13-14):

the relatively small amount of the intermediate layer typically results in a barrier sheet which is flexible, and typically drapable and lightweight, factors customarily also taken into consideration in determining the comfort of wearing apparel.

Thus, as set forth in the specification at (page 9, lines 26-27), "only a relatively small amount of the intermediate layer 20 is required." The same paragraph specifies that the basis weight of the liquid-expandable material, prior to exposure to liquid, is no greater than 15 gsm, typically no greater than 10 gsm, preferably no greater than 5 gsm,

and more preferably no greater than 3 gsm, and optimally no greater than 2 gsm. The same paragraph specifies that, alternatively, the liquid-expandable material, prior to exposure to liquid, has a basis weight no greater than 10% of the basis weight of the sheet 10, prior to exposure to liquid, typically no greater than 5%, preferably no greater than 4%, more preferably no greater than 2%, and optimally no greater than 1%.

The specification notes that, even though the absolute basis weight limitation is typically of greater significance than the percentage basis weight limitation, “an intermediate layer which meets the percentage basis weight limitation may also be useful in the present invention even though it does [not] meet the absolute basis weight limitation” (page 10, lines 12-20). Through a clerical error the “not” is omitted, but the intention of the paragraph is clear and unmistakable.

The basis weight limitations on the liquid-expandable material is set forth in each of independent Claims 1, 34, 67, 101, 104 and 107. There are numerous dependent claims which impose even more stringent requirements on the basis weight of that layer: Claims 4-7 and 21-24 relative to Claim 1, Claims 37-38, 62-63 and 52-55 relative to Claim 34, and Claims 70-71, 92-93 and 84-87 relative to Claim 67. Indeed, Claims 25, 56 and 88 expressly require that the entire barrier sheet or garment incorporating the same be “flexible” which, as noted above, translates into a limitation on the basis weight of the liquid-expandable material as well as all the other layers involved.

What does Ciammaichella teach in this regard?

Ciammaichella broadly states in the specification that the liquid-swellaable material “should preferably be applied at a basis weight of from 5 gsm to 300 gsm,

preferably from 10 gsm to 250 gsm" (col. 6, lines 55-59). There is no corresponding broad statement in Ciammaichella regarding the quantity of liquid-swellable material to be applied as a percentage of the basis weight of the barrier sheet.

In his examples, however, Ciammaichella teaches the use of liquid-swellable materials having a basis weight of 50 gsm (Example 1), 43 gsm (Example 2), 14 gsm (Example 3), 25 gsm (Example 4) and 95 gsm (Example 5). Thus the Ciammaichella examples teach only a range of 14-95 gsm for the liquid-swellable material. When one takes into account the layers of non-adhesive material employed in each of the examples, the Ciammaichella liquid-swellable material has a basis weight of 38% (Example 1), 35% (Example 2), 17.7% (Example 3), 28% (Example 4) and 47% (Example 5). Thus, the Ciammaichella percentage basis weight varies from 17.7% of the basis weight of the sheet prior to exposure to liquid (Example 3) all the way up to 47% (Example 5).

To summarize, excluding the weight of any adhesive used, the Ciammaichella examples teach a barrier layer having a basis weight of 17.7%-47% of the weight of the barrier sheet, whereas Applicant's claims require a weight no greater than 10%. Applicant respectfully submits that a barrier sheet having a basis weight as high as that taught as a minimum by Ciammaichella would not infringe Applicant's independent claims and would simply not be "flexible," as required by Applicant's dependent Claims 25, 56, and 88.

The Examiner will appreciate that the percentage basis weight limitation being relied upon was present in the claims from the original filing of the application and thus

Appl. No. 10/086,532
Amdt. dated May __, 2004
Reply to Office Action of March 1, 2004

neither introduces new matter nor requires additional search. Accordingly, Application respectfully submits that the present Amendment should be entered.

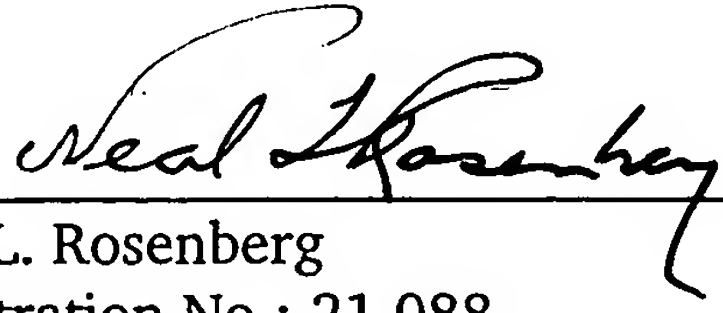
In view of the above amendments and remarks, reconsideration of the rejection and allowance of all claims is respectfully requested.

If an extension of time is required to enable this document to be timely filed and there is no separate Request for Extension of Time, this document is to be construed as also constituting a Request for Extension of Time Under 37 C.F.R. §1.136(a) for a period of time sufficient to enable this document to be timely filed. Any fee required for such a Request for Extension of Time and any other fee required by this document pursuant to 37 C.F.R. §§1.16 and 1.17 and not submitted herewith should be charged to the Deposit Account of the undersigned attorneys, Account No. 01-1785; any refund should be credited to the same account. One copy of this document is enclosed.

Respectfully submitted

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Dated: New York, New York
May 2004
June 1,

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